Computers in judicial administration

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INTRODUCTION

The number of computer installations in the courts has increased rapidly in the past ten years. This trend indicates an enthusiasm in the courts to acquire the scientific and industrial technology that the business community has successfully used. The computer is recognized as being a major tool of technological development and for its tremendous capability for upgrading the quantity and quality of a wide variety of functions and services. However, while looking in ecstasy at the new horizons of computer technology, we must realize the computer's dependency upon man. Computers are unlike any other machine. Switch on a water pump and water is pumped, but switch on a computer and nothing happens unless precise instructions have been prepared.

Today's courts are similar to businesses. They are complex organizations which store large amounts of detailed information. Court files require precise methods for processing and retrieving this information.

Modern computer technology is well suited to the task of accomplishing the repetitive job of maintaining accurate up-to-date information that is easily retrievable. The computer can also create access to information which was previously too costly to assemble.

The courts now using automation experience improved record-keeping efficiency. Computers provide timely and effective management information to individual courts as well as to the Supreme Court and other criminal justice agencies.

The potential capabilities of systems technology can provide the courts with standardized reports and services. Computers can provide this wide range of services in far less time than manually possible. The services and reports that can be produced for the courts are numerous.

Basic docketing and indexing services are typical services. The docket, listing cases to be heard in specific courts on specific dates, can be generated. The computer can retrieve cases or records based on a particular piece of data such as the name of the defendant, docket number, summons number, type of case, date, or other piece of identifying information. This permits the court to make direct inquiry into case records and to update records by visual display terminals located in individual courts.

Cases can be listed by judge, by attorney, and by docket number to keep track of case and schedule conflicts. Particular cases which require follow up or review for specific reasons are listed as exceptions. Notices are automatically prepared as required by the court. These capabilities improve case flow management and reduce the amount of paperwork needed to maintain records and administrative activity. Periodic statistical reports are generated on caseload and courtroom activities for individual courts.

Improved statewide caseload information can be provided to judges, clerks and the Supreme Court on a regular basis. Information on caseload, case age, pending cases, hearings, dispositions and workload forecasting are by-products of computerized record-keeping. This, too, can be used for effective judicial management.

Successful implementation requires careful study by local courts and the Supreme Court. Implementation depends upon long-term cooperation during the necessary trial-and-error process in the initial stages of development.

CONTRIBUTIONS AND PROBLEMS

The trend toward computers is due to the increased workload of the court. Traditionally, the measure of judicial workload has been filings. As filings increase, the complexity of the court and clerk's office operations increases. Computers were solicited to cure inefficiencies. The computer is solving major problems by reducing backlog and delay, improving scheduling and reducing redundant tasks.

Computers will continue to make substantial contributions to court administration. However, automation is not a total panacea. Technology can do little to reduce backlogs and delays stemming from strategy, not procedure. It will not expedite courtroom proceedings established by due process. The computer is an aid to management but is not a substitute for such things as judicial selection, discipline and sentencing.

Even though there are many admirable automated judicial systems throughout the country, judicial computerization on the national, state and local levels faces difficulty. Several reasons exist which indicate the depth of the problem. Vendors have oversold their products. Sales techniques have been more successful than applications. The judges who run

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the courts are not businessmen. They are easily influenced by a smooth sales pitch. However, once stung by an expensive, inefficient application, they will not be sold again.

Funding has been a major problem also. Computerization costs money and budgets are usually controlled by the executive branch at all levels of government. The judiciary is sensitive to invasion by the other government branches and may not pursue funding. The most popular solution is to share the expertise and hardware of the executive branch. Court processing is not easily understandable. Lack of communication and scheduling priority conflicts often doom joint projects. The judicial branch is very sensitive with respect to privacy and security.

If these problems are resolved, and actual design of a system begins, the lack of in-house expertise becomes a hurdle. More failures than successes were produced in early judicial data processing projects. This was due to inadequate planning, poor scheduling and insufficient testing. Projects were generally too big and not implemented in stages.

Even with growing caseloads, the computer is not necessarily the solution. Most courts have not reached the point where adding more people does not solve the problem. Only the urban courts are overburdened. The practical solution to increased caseload may be better manual techniques, forms design, specialization of tasks, elimination of duplication and word-processing equipment.

The final problem encountered in the courts has been resistance to change. The courts are the most conservative of the three branches of government. Many courts use the same record-keeping procedures implemented in the English courts and imported to the colonies.

CATEGORIES OF AUTOMATION

Considering the problems, it is surprising that the courts have considered any automation. In many instances, the courts have not had a choice. Caseload in urban-centered courts has reached overwhelming proportions and so has the paperwork. Therefore, three categories of systems at two levels have been developed. The three categories are administrative systems, case record and trial systems and legal research systems. The two levels are at the court and the administrative.

Administrative systems are payroll, personnel, budget, inventory and financial record systems, that is, the routine business systems. Statistical systems allow for caseflow management of the courts. Case record and trial systems deal with case tracking, docketing, indexing, case scheduling, jury selection and management and information systems exchange with other criminal justice agencies. Some systems are useful at only one level. Others perform at both and still others serve as a means of communication between the two levels.

VIRGINIA'S SYSTEMS

In reviewing Virginia's computerized systems, it is beneficial to keep in mind the structure of the judicial system. The District Courts were unified under the state in 1973. Prior to that time, they were municipal courts and independent. These are the lowest level courts and have the greatest volume, most cases and the need for computerization. The Circuit Court clerk's offices are local and totally independent. There is no standardization and low volume. The average number of commenced cases per circuit judge in 1977 was 1,100 or approximately one case every two hours. The Supreme Court stands at the top of the judicial branch. There are numerous computer applications at the District Court and Supreme Court. Only one Circuit Court currently has or is developing a system.

The Office of the Executive Secretary (OES) of the Vir-

FUND 114 01 001 FINANCIAL ANALYSIS AS OF AUGUST 1, 1976 9/17/76

DISTRICT 16 CHARLOTTESVILLE GENERAL DISTRICT COURT

OBJECT		(A) FY77 BUDGET	(B) JULY EXPENSES	(C) Y-T-D EXPENSES	(D) % B/A	(E) % C/A	BALANCE (A-C)	% TIME LEFT	% BUDGET BALANCE
1110	SALARIES	42,080.98	3,506.75	3,506.75	8.0	8.0	38,574.23	92.0 92.0	92.0
1120	WAGES	190.30	0.00	0.00	0.0	0.0	190.30	92.0	100.0
1243	TRAVEL-MILEAGE	375.00	50.00	50.00	13.0	13.0	325.00	92.0	87.0
1261	POSTAL SERVICES	300.00	100.00	100.00	33.0	33.0	200.00	92.0	67.0
1270	PRINTING	1,300.00	0.00	0.00	0.0	0.0	1,300.00	92.0	100.0
1340	OFFICE SUPPLIES	400.00	23.75	23.75	6.0	6.0	376.25	92.0	94.0
	LOCATION TOTAL	44,646.28	3,680.50	3,680.50	8.0	8.0	40,965.78	92.0	92.0

Exhibit 1

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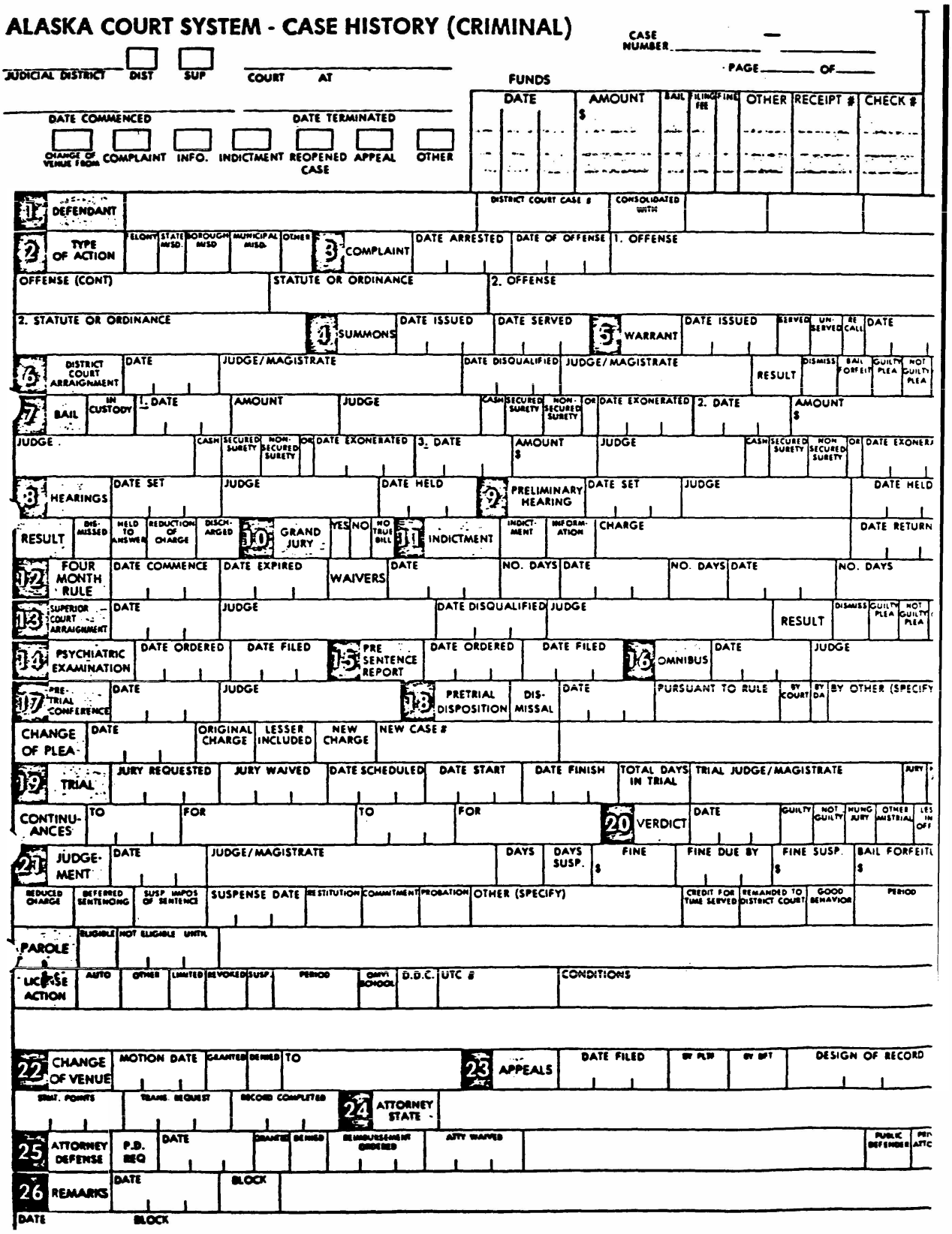

Exhibit 2

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White—Commencement
Pink—Termination
Yellow—File Copy

REPORT TO JUDICIAL ADMINISTRATOR AND JUDICIAL COUNCIL

Judicial District_____ County_____

1. ☐ REGULAR CIVIL

2. Case No._____

COMMENCEMENT

3. Date Commenced_____
4. ☐ Retrial or Reinstatement
(If No. 4 is checked, put an asterisk before Case No.)
5. Division No._____
(Multi-judge district only)

Nature of Action

6. ☐ Auto Negligence
7. ☐ Other Tort
8. ☐ 60-1507
9. ☐ Foreclosure
10. ☐ Real Property
11. ☐ Contractual
☐ Inj., Q. W. & Mand.
13. ☐ Other

} Check Only One

TERMINATION

14. Date Terminated_____
15. ☐ Case was Pre-tried

16. ☐ Dismissed
17. ☐ Not Contested
18. ☐ Contested Court
19. ☐ Contested Jury

} Check Only One

25. ☐ Regular Judge, Div. No._____
26. ☐ Assigned Judge (from another district)

1. ☐ DOMESTIC RELATIONS

2. Case No._____

COMMENCEMENT

3. Date Commenced_____
4. ☐ Retrial or Reinstatement
(If No. 4 is checked, put an asterisk before Case No.)
5. Division No._____
(Multi-judge district only)

Nature of Action

6. ☐ Divorce
7. ☐ Sep. Maintenance
8. ☐ Annulment
9. ☐ Recip-in
10. ☐ Recip-out
11. ☐ Other

} Check Only One

TERMINATION

12. Date Terminated_____
13. ☐ Case was Pre-tried

14. ☐ Dismissed
15. ☐ Not Contested
16. ☐ Contested Court

} Check Only One

17. ☐ Divorce Granted
18. ☐ Divorce Denied
19. ☐ Annulment Granted
20. ☐ Annulment Denied
21. ☐ Sep. Mtnce. Granted
22. ☐ Sep. Mtnce. Denied

} Do Not Check More Than One

28. ☐ Regular Judge, Div. No._____
29. ☐ Assigned Judge (from another district)

1. ☐ CRIMINAL

2. Case No._____

COMMENCEMENT

3. Date Commenced_____
4. ☐ Retrial or Reinstatement
(If No. 4 is checked, put an aste
before Case No.)
5. Division No._____
(Multi-judge district only)

Felony

6. ☐ Crime Against Person
7. ☐ Crime Against Property
8. ☐ Other

Misdemeanor

9. ☐ D. W. I
10. ☐ Other Traffic
11. ☐ Other Misdemeanor

Appeal

12. ☐ D. W. I.
13. ☐ Other Traffic
14. ☐ Other Offenses

} C C

TERMINATION

15. Date Terminated_____
16. ☐ Dismissed
16a. ☐ Appeal Dismissed
17. ☐ Guilty Plea
17a. ☐ Other Uncontested Termination
18. ☐ Contested Court
19. ☐ Contested Jury

} Check Only One

20. ☐ Convicted
21. ☐ Acquitted

} Check only if No. 18 or 19 is checked

27. ☐ Regular Judge, Div. No.___
28. ☐ Assigned Judge (from anoth district)

Exhibit 3

From the collection of the Computer History Museum (www.computerhistory.org)

MAINE SUPERIOR COURT CRIMINAL STATISTICS REPORTING FORM

1. Region _____ 2. County _____ 3. County No. _____

4. Case No. _____ 5. No. of Defendants _____ 6. Date Filed: ___|___|___

A. TYPE OF CASE

New Filings
1. ☐ Bail Review
2. ☐ Transfer
3. ☐ Appeal
4. ☐ Boundover
5. ☐ Indictment
6. ☐ Information
7. ☐ Juvenile Appeal
8. ☐ Other

Refilings
1. ☐ Revocation
2. ☐ New Trial
3. Date Refiled ___|___|___

B. CLASS OF CHARGE
1. ☐ A
2. ☐ B
3. ☐ C
4. ☐ D
5. ☐ E

C. ACTION INFORMATION	*Defendant #1*	*Defendant #2*	*Defendant #3*
1. Date of First Superior Court Appearance	___|___|___	___|___|___	___|___|___
2. Date Capias Issued	___|___|___	___|___|___	___|___|___
3. Court Appointed Counsel	☐	☐	☐
4. Date Trial Began	___|___|___	___|___|___	___|___|___
5. No. of Trial Days	___.___	___.___	___.___
6. Jury	☐	☐	☐
7. Jury Waived Trial	☐	☐	☐
8. Date Plead Guilty	___|___|___	___|___|___	___|___|___

D. DISPOSITION INFORMATION			
1. District Court Bail Revised	☐	☐	☐
2. District Court Bail Affirmed	☐	☐	☐
3. Dismissed by Court	☐	☐	☐
4. Dismissed by D.A. R. 48 (a)	☐	☐	☐
5. Filed Case	☐	☐	☐
6. Juvenile Appeal Denied	☐	☐	☐
7. Juvenile Appeal Affirmed	☐	☐	☐
8. Juvenile Appeal, New Sentence	☐	☐	☐
9. Not Guilty, Reason of Insanity	☐	☐	☐
10. No Bill	☐	☐	☐
11. Probation Revoked	☐	☐	☐
12. Convicted	☐	☐	☐
13. Acquitted	☐	☐	☐
14. Mistrial	☐	☐	☐
15. Date Disposed	___|___	___|___	___|___
16. Justice Initials	_____	_____	_____

E. SENTENCE AND COMMITTMENT INFORMATION			
1. Probation	☐	☐	☐
2. Correctional Center	☐	☐	☐
3. Youth Center	☐	☐	☐
4. State Prison	☐	☐	☐
5. County Jail	☐	☐	☐
6. Unconditional Discharge	☐	☐	☐
7. Fine	☐	☐	☐
8. Mental Health Commitment	☐	☐	☐
9. Partially Suspended Sentence	☐	☐	☐
10. Suspended Sentence	☐	☐	☐
11. Date Sentenced	___|___	___|___	___|___

Exhibit 4

From the collection of the Computer History Museum (www.computerhistory.org)

1. TYPE OF CASE ☐ (CR) —CRIMINAL ☐ (CV) —CIVIL ☐ (JU) —JUVENILE

2. COUNTY — [0] _____

3. CASE NUMBER — _____

[10] **FILING**

4. DATE OF FILING — Month | Day | Year

5. TRAFFIC RELATED ☐ (01) Yes ☐ (02) No

6. SOURCE OF CASE ☐ (03) Original Action ☐ (04) Reopened Case

7. Charge/Type Of Action

CRIMINAL	JUVENILE	CIVIL
☐ (05) Felony A	☐ (13) Delinquency	☐ (19) Damages
☐ (06) Felony B	☐ (14) Unruly	☐ (28) Action on Debt
☐ (07) Felony C	☐ (15) Deprived Child	☐ (29) Real Estate Matter
☐ (08) Misdemeanor A	☐ (16) Special Proceedings	☐ (21) Divorce
☐ (09) Misdemeanor B	☐ (17) Termination of Parental Rights	☐ (22) Reciprocal Support
☐ (10) Infraction	☐ (18) Other (Explain Below)	☐ (23) Adoption
☐ (30) Special Remedy		☐ (24) Appeal-Admin. Hearing
☐ (11) Appeal		☐ (25) Appeal—Other
☐ (12) Other (Explain Below)		☐ (26) Special Remedy
		☐ (39) Trusts
		☐ (27) Other (explain below)

8. Remarks

[20] **DISPOSITION**

9. DATE OF FINAL DISPOSITION — Month | Day | Year

	CRIMINAL	JUVENILE	CIVIL
10. TRIAL/HEARING	☐ (01) Jury ☐ (02) Non-Jury ☐ (03) Not Contested	☐ (22) Referee Hearing ☐ (23) Court Hearing	☐ (38) Jury ☐ (39) Non-Jury ☐ (40) Not Contested
11. Judgment	☐ (04) Felony A—Guilty ☐ (05) Felony B—Guilty ☐ (06) Felony C—Guilty ☐ (07) Misdemeanor A—Guilty ☐ (08) Misdemeanor B—Guilty ☐ (09) Infraction—Guilty ☐ (10) Acquittal ☐ (11) Dismissal ☐ (13) Uniform Post Conviction Procedures Act ☐ (12) Change of Venue to _____	☐ (24) Judgment after Hearing ☐ (25) Waive to Adult Court ☐ (26) Acquittal ☐ (27) Dismissal	☐ (41) Judgment after Trial ☐ (49) Divorce Decree ☐ (50) Adoption Decree ☐ (42) Default Judgment ☐ (43) Summary Judgment ☐ (44) Special Remedy Judgment ☐ (45) Voluntary Dismissal ☐ (46) Involuntary Dismissal ☐ (51) Termination of Trust ☐ (47) Change of Venue to _____ ☐ (48) Other (Explain below)

12. JUDGE/REFEREE RESPONSIBLE — JUDGE _____

13. Sentence/Placement

☐ (14) County Jail	☐ (29) State Industrial School
☐ (15) State Penitentiary	☐ (30) Private Institution
☐ (16) State Farm	☐ (31) Adoptive Agency Placement
☐ (17) Deferred Imposition	☐ (32) Probation to Parents
☐ (18) Suspended Sentence	☐ (33) Court Supervised Probation
☐ (19) Fine/Costs	☐ (34) State Youth Authority
☐ (20) Restitution	☐ (35) Foster Home
☐ (21) Other (explain below)	☐ (36) Group Home
	☐ (37) Other (Explain Below)

14. Remarks _____

Exhibit 5

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COURT NAME _____ 114- COURT ID. NO. _____ FILING DATE _____

MONTHLY SUMMARY REPORT
UNIFORM DOCKETING/CASELOAD REPORTING SYSTEM

STATISTICS FOR THE MONTH AND YEAR OF: _____

GENERAL DISTRICT COURT STATISTICS

CRIMINAL STATISTICS:

NUMBER OF REVIEW PROGRESS HEARINGS	_____	(CODE 0)
NUMBER OF BOND/ARRAIGNMENT/COUNSEL APPT. HEARINGS	_____	(CODE 1)
NUMBER OF EXTRADITION HEARINGS	_____	(CODE 2)
NUMBER OF PRELIMINARY HEARINGS	_____	(CODE 3)
NUMBER OF ADJUDICATORY HEARINGS WITH TESTIMONY	_____	(CODE 4)
NUMBER OF ADJUDICATORY HEARINGS WITHOUT TESTIMONY	_____	(CODE 5)
NUMBER OF DISPOSITIONAL HEARINGS	_____	(CODE 6)
NUMBER OF HEARINGS WAIVED	_____	(CODE 9)
TOTAL NUMBER OF HEARINGS & HEARINGS WAIVED		_____ (CODES 0-9)
NUMBER OF 'NEW' TRANSACTIONS	_____	('NEW' CIRCLED)
NUMBER OF 'CONTINUED' TRANSACTIONS	_____	('CONT' CIRCLED)
TOTAL NUMBER OF TRANSACTIONS		_____ (NEW + CONT)
NUMBER OF TRANSACTIONS BEARING FINAL DISPOSITIONS	_____	('*' CODED)

TRAFFIC STATISTICS:

NUMBER OF REVIEW PROGRESS HEARINGS	_____	(CODE 0)
NUMBER OF BOND/ARRAIGNMENT/COUNSEL APPT. HEARINGS	_____	(CODE 1)
NUMBER OF PRELIMINARY HEARINGS	_____	(CODE 3)
NUMBER OF ADJUDICATORY HEARINGS WITH TESTIMONY	_____	(CODE 4)
NUMBER OF ADJUDICATORY HEARINGS WITHOUT TESTIMONY	_____	(CODE 5)
NUMBER OF DISPOSITIONAL HEARINGS	_____	(CODE 6)
NUMBER OF HEARINGS WAIVED	_____	(CODE 9)
TOTAL NUMBER OF HEARINGS & HEARINGS WAIVED		_____ (CODES 0-9)
NUMBER OF 'NEW' TRANSACTIONS	_____	('NEW' CIRCLED)
NUMBER OF 'CONTINUED' TRANSACTIONS	_____	('CONT' CIRCLED)
TOTAL NUMBER OF TRANSACTIONS		_____ (NEW + CONT)
NUMBER OF TRANSACTIONS BEARING FINAL DISPOSITIONS	_____	('*' CODED)

CIVIL STATISTICS:

NUMBER OF CIVIL HEARINGS WITH TESTIMONY	_____	(CODE 7)
NUMBER OF CIVIL HEARINGS WITHOUT TESTIMONY	_____	(CODE 8)
NUMBER OF CASES DISMISSED PRIOR TO COURT	_____	(CODE 9)
TOTAL NUMBER OF HEARINGS & DISMISSED CASES		_____ (CODES 7-9)
NUMBER OF SUITS IN DEBT	_____	(SUFFIX D)
NUMBER OF GARNISHMENTS	_____	(SUFFIX G)
NUMBER OF UNLAWFUL DETAINERS	_____	(SUFFIX U)
NUMBER OF OTHER CIVIL CASES	_____	(SUFFIX O)
NUMBER OF 'NEW' TRANSACTIONS	_____	('NEW' CIRCLED)
NUMBER OF 'CONTINUED' TRANSACTIONS	_____	('CONT' CIRCLED)
TOTAL NUMBER OF TRANSACTIONS		_____ (NEW + CONT)
NUMBER OF TRANSACTIONS BEARING FINAL DISPOSITIONS	_____	('*' CODED)

CRIMINAL + TRAFFIC + CIVIL:

WARRANTS WRITTEN	_____	CHECKS WRITTEN	_____
APPEALS PROCESSED	_____	MENTAL COMMITMENT HEARINGS HELD BUT NOT DOCKETED	_____
RECEIPTS WRITTEN	_____		

Exhibit 6

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ginia Supreme Court handles the administration of the General District and Supreme Courts in total and the Circuit Court Judges. The OES is also responsible for 426 magistrates. Personnel and payroll systems are centrally handled by the OES. The budgets of each court with revenues and expenditures are tracked by an automated budget tracking system (ABTS). The ABTS produces a financial analysis statement for each court on a monthly basis, generates a summary of state and local revenues and state expenditures, and provides the basis, justification, and documentation for the judicial budget (Exhibit 1).

Certain individual courts keep automated financial records. These are the earliest and most successful applications. These courts track fine payments, support arrears, support check writing and support accounting.

The OES maintains statistical systems. These systems summarize caseload and measure judicial workload. The results are used to obtain federal funding from the Law Enforcement Assistance Administration (LEAA), determine the number of judgeships and personnel for individual courts and to justify budgets.

There are two schools of thought concerning statistical systems. One school supports case-by-case statistics. This involves the collection of all critical information on a particular case plus any decision points and change of status. All statistics needed are generated from the data bank. Such a system is very flexible and produces many results; exception reporting, sentencing disparities, continuance studies, and case tracking. These are balanced against the negative consequences of tremendous amounts of paperwork, time consumption for clerical personnel, very large computer files, and great expense. The developmental cost is several million

COURT _____ **GENERAL DISTRICT COURT DOCKET** PAGE ___ OF ___ PAGE 1 (1)

JUDGE _____ **CRIMINAL DIVISION** DATE _____ TIME _____ DATE _____

COURT # _____

FILE #	DEFENDANT / COUNSEL / CA P W	CHARGE / OFF DTE / OFFICER / CMPLNT.	BOND $ / TYPE	PLEA	DISPOSITION / CCRE DATE / APPEAL DATE	TRANS TYPE	NEW / CONT	DISP	*	BENCH MINUTES
1	CA P W				1	1	N C			
2	CA P W				2	2	N C			
3	CA P W				3	3	N C			
4	CA P W				4	4	N C			
5	CA P W				5	5	N C			
6	CA P W				6	6	N C			
7	CA P W				7	7	N C			
8	CA P W				8	8	N C			
9	CA P W				9	9	N C			
10	CA P W				10	10	N C			
11	CA P W				11	11	N C			
12	CA P W				12	12	N C			
13	CA P W				13	13	N C			
14	CA P W				14	14	N C			

UDS-1 JAN 77

Exhibit 7

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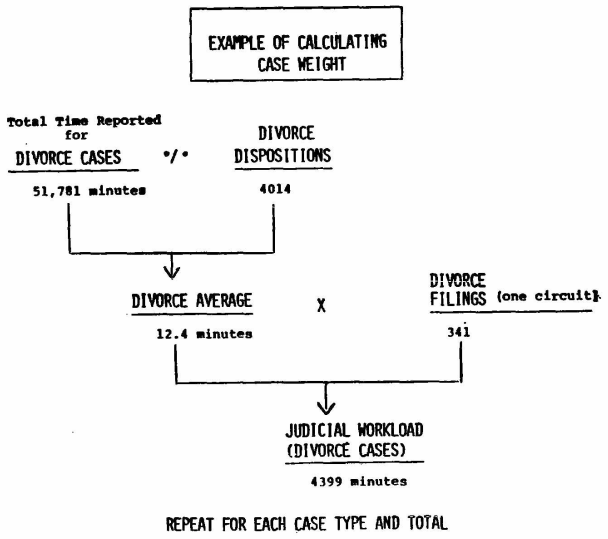

Exhibit 8

dollars plus operational maintenance costs of $500,000 annually.

The second method is to collect summary statistics. The design incorporates what is needed and is collected on a summary basis from the courts. The advantage of summary systems is the reduction in paperwork and expense. A summary statistical system can be developed for $150,000 and operated for $25,000 per year. Neither approach is successful unless a strong and supportive Chief Justice and Court Administrator control the Courts. The capture of the data elements must be an integral function of the clerk's office. Exhibits 2, 3, 4, and 5 give an indication of the large amount of data that must be included for case by case statistics.

Virginia has three caseload reporting systems:

1. Uniform Docketing & Caseload Reporting System—District Courts.
2. Circuit Court Caseload Reporting and Judicial Workload Systems.
3. Magistrate Statistical System.

These are batch-operated systems. They are programmed in COBOL and run on an IBM 370/158 (2) system under OS-VS2 with 1024k storage.

The Uniform Docketing System is divided into two subsystems. The first part is used in the clerk's office to standardize case scheduling and indexing in the District Courts. The second part of the system has three purposes: to count basic cases, to determine judicial workload and to indicate clerical workload. Monthly summary reports (Exhibit 6) are completed using the tearoff from the Uniform Docket (Exhibit 7).

Counts of cases are not enough to determine workload. The different types of cases do not take equal amounts of time to process or hear in the courtroom. There is a need to weight cases depending upon their complexity. The bench minutes for each case type are sampled. Using a statewide average time for each category of cases multiplied by the number of cases for a particular court, the amount of judicial work is calculated for that court (Exhibits 8 & 9). The "normal judge year" is administratively determined and used to calculate the number of judges needed to staff the court. Clerical workload uses a similar procedure. Weights are determined by spot-checking the time spent on case-related work.

The Circuit Court Caseload Reporting and Judicial Workload System is also a case-weighting system. The basic caseload summary gives the categories of civil and criminal cases. Also included are jury data and case aging information (Exhibits 10 & 11). The basic caseload counts of filings and dispositions will be weighted based on the average judicial time per case. Judges are timed to determine the amount of time each of the general categories of cases takes for disposition. Exhibits 12 and 13 are the forms used for sampling workload. Weights are based on both bench time and case-related chambers time (Exhibit 14).

CASE RECORD AND TRIAL SYSTEMS

Case record and trial information systems at the court level aid clerical staff with redundant clerical efforts. Such systems increase the accessibility of records and provide the most complete records possible. These systems have certain common characteristics. Each case is one record including basic case and individual information and status. Multiple indices are established which are typically manual, single directional. Automated indices expand the court index to systems similar to those in a library. The number, name, attorney, judge, status, offense, or disposition may be used

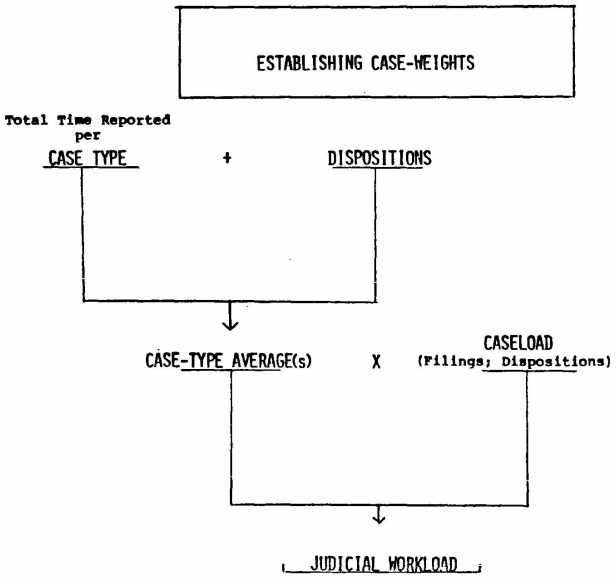

Exhibit 9

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MONTHLY CASELOAD REPORT
CIVIL CASES

2 | | | | Circuit I.D. Number (1)

Month | Year (7)

C (13)

STATISTICS FOR THE MONTH OF:

City/County of:

For Office Use Only (501)

Cases on Docket	Condemnation	Appeals	All Other Law	Divorce	All Other Chancery
Cases Commenced During Month By:					
1. Initial Filing	21				
2. Supplemental Petition			49		
3. Other	61				
4. Total Cases Commenced During Month	81				
Cases Terminated During Month By:					
5. Settlement/Voluntary Dismissal Prior to Trial	101				
6. Default Judgment	121				
7. Trial – JUDGE (with witnesses)	141				
8. – Decree on Depositions				173	
9. – Recommendation by Commissioner	181				
10. Trial – JURY	201				
Purged per Virginia Code Section 8-154					
11. – after two years	221				
12. – after five years	241				
13. Other	261				
14. Total Cases Terminated During Month	281				

Cases Set For Trial	Law	Chancery
15. During Month, Number of Cases Assigned Trial Dates	301	
16. Of the Cases Reported in Line 15 above, the Number of Cases Set Ninety (90) Days or More From Date of Setting	321	
Jury Trial Days		
17. Number of Days Spent in Jury Trials During Month	341	

History of Terminated Cases Number of cases terminated during month which were filed:	Condemnation	Appeals	All Other Law	Divorce	All Other Chancery
18. This Year	361				
19. One Year Ago	381				
20. Two Years Ago	401				
21. Three Years Ago	421				
22. Four Years Ago	441				
23. Five or More Years Ago	461				
24. TOTAL – The Sum of these should equal the sum of Line 14.	481				

Date

Circuit Court Clerk

Report Preparer

Exhibit 10

From the collection of the Computer History Museum (www.computerhistory.org)

MONTHLY CASELOAD REPORT
CRIMINAL CASES

2 | | | Circuit I.D. Number (1)

Month | Year (7)

R (13)

STATISTICS FOR THE MONTH OF:

City/County of:

For Office Use Only (521)

Cases on Docket	Class 1 & 2 Felony	Other Felony	Misdemeanor	Habeas Corpus Post-Conviction
Cases Commenced During Month By:				
1. Indictment/Presentment/Information	21			
2. Appealed from General District Court			49	
3. Appealed from J&DR Court	61			
4. Reinstatement	81			
5. Other	101			
6. Total Cases Commenced During Month	121			
Cases Terminated During Month By:				
7. Withdrawal Prior to Trial			149	
8. Dismissed by Court Without Trial	161			
9. Nolle Prosequi by Commonwealth Attorney	181			
10. Guilty Plea	201			
11. Trial–JUDGE (with witnesses)	221			
12. Trial–JURY	241			
13. Other	261			
14. Total Cases Terminated During Month	281			
15. Number of Fugitives Apprehended During Month	301			
16. Number of Fugitives Added During Month	321			
17. Total Cases in Abeyance at End of Month	341			

Cases Set For Trial	Felony	Misdemeanor
18. During Month, Number of Cases Assigned Trial Dates	361	
19. Of Those Cases Reported in Line 18 above, the Number of Cases Not Set for Trial During Present Term	381	
Jury Trial Days		
20. Number of Days Spent in Jury Trials During Month	401	

History of Terminated Cases Number of cases terminated during month which were filed:	Class 1 & 2 Felony	Other Felony	Misdemeanor	Habeas Corpus Post-Conviction
21. This Term	421			
22. Prior to This Term, but not more than Five Months Ago	441			
23. From Five to Nine Months Ago	461			
24. More Than Nine Months Ago	481			
25. TOTAL – The Sum of these should equal the Sum of Line 14.	501			

Date

Circuit Court Clerk

Report Preparer

Exhibit 11

From the collection of the Computer History Museum (www.computerhistory.org)

DAILY COURTROOM ACTIVITY SHEET

1 Circuit I.D. Number	7 T	9 Month	Day	Year
2				

ACTIVITY CODE					
CIVIL CASES		7.	Docket Day	12.	Trial–Jury
1.	Default Judgment	CRIMINAL CASES		13.	Other
2.	Trial–Judge (w/witnesses)			14.	Pre-trial Evidentiary Hearings
3.	Trial–Jury	8.	Dismissed by Court w/o Trial	15.	All Other Pre-Trial Hearings
4.	Other	9.	Nolle Prosequi By Commonwealth Attorney	16.	Sentencing Hearings
5.	Pre-Trial Hearings	10.	Guilty Plea	17.	All Other Post-Conviction Hearings
6.	Post-Trial/Judgment Hearings	11.	Trial–Judge (w/witnesses)	18.	Docket Day

COURTROOM CLOCK TIME

(08:30 to 09:20; 09:30 to 10:30, 10:40 to 10:45, etc.)

15 20

						CIVIL					CRIMINAL							
						CONDEMNATION 25 A	APPEALS B	ALL OTHER LAW C	DIVORCE D	ALL OTHER CHANCERY E	CLASS 1& 2 FELONY F	ALL OTHER FELONY G	MISDEMEANOR H	HABEAS CORPUS POST-CONVICTION I		NUMBER OF ACTIVITIES 26-27	NUMBER OF CASES TERMINATED 28-29	ACTIVITY (See Code Above) 30-32
Sample Entry	0 8 : 3 0	A M	to	1 2 : 3 0	P M						✓					3	3	15
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													
	:	M	to	:	M													

Exhibit 12

From the collection of the Computer History Museum (www.computerhistory.org)

DAILY CHAMBERS ACTIVITY SHEET

ACTIVITY CODE	
101.	Hearing Motions
102.	Pretrial Conferences
103.	Researching/Writing Opinions
104.	Other Case—Related Work
105.	All Other Work
106.	Travel Time

2 ___ ___ ___ (1 Circuit I.D. Number) T (7) Month ___ Day ___ Year ___ (9)

CHAMBERS CLOCK TIME

(E.G., 08:30 to 9:20; 09:20 to 10:00; 10:50 to 11:30)

(15 – 20)

			CIVIL					CRIMINAL							
			CONDEMNATION (25) A	APPEALS B	ALL OTHER LAW C	DIVORCE	ALL OTHER CHANCERY D	CLASS 1 & 2 FELONY E	ALL OTHER FELONY F	MISDEMEANOR G	HABEAS CORPUS POST-CONVICTION H	I	NUMBER OF ACTIVITIES (26–27)	NUMBER OF CASES TERMINATED (28–29)	ACTIVITY (See Code Above) (30–32)
08:30 AM	to 12:30 PM					✓							3	1	101
___:___ M	to ___:___ M														
___:___ M	to ___:___ M														
___:___ M	to ___:___ M														
___:___ M	to ___:___ M														
___:___ M	to ___:___ M														
___:___ M	to ___:___ M														
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___:___ M	to ___:___ M														
___:___ M	to ___:___ M														
___:___ M	to ___:___ M														

Exhibit 13

From the collection of the Computer History Museum (www.computerhistory.org)

COURT OR CIRCUIT

24TH CIRCUIT

-- CIVIL ----------	CONDEM-NATIONS	APPEALS	OTHER LAW	DIVORCE	CHANCERY	TOTAL	CIVIL & CRIMINAL ---- TOTALS ----
COMMENCED	10	4	99	204	125	442	779
CONCLUDED	1	3	85	190	103	382	676
PENDING	32	22	314	174	472	1014	1643
#COMMENCED/CONCLUDED	10.00	1.33	1.16	1.07	1.21		
WEIGHT	30	1	8	4	8		
WEIGHTED COMMENCED	300	4	792	816	1000	2912	4345
WEIGHTED CONCLUDED	30	3	680	760	824	2297	3567

-- CRIMINAL --------	1 & 2 FELONY	OTHER FELONY	MISD	HAB.CORP. POST-CONV	TOTAL
COMMENCED	20	188	127	2	337
CONCLUDED	18	167	108	1	294
PENDING	114	183	331	1	629
#COMMENCED/CONCLUDED	1.11	1.13	1.18	2.00	
WEIGHT	18	5	1	3	
WEIGHTED COMMENCED	360	940	127	6	1433
WEIGHTED CONCLUDED	324	835	108	3	1270

#JUDGES	4
JUDICIAL STANDARD	1000
WGHT. COMMENCED / JUD. STANDARD	4.35
WGHT. CONCLUDED / JUD. STANDARD	3.6

Exhibit 14

to find the case records. These systems feed statistical systems and transmit data to other agencies.

The TRACER system in the Norfolk Court is an excellent system. It is an on-line criminal justice information system functioning for multiple agencies including Police, Jail, Commonwealth Attorney and Probation/Parole Department, as well as the District and Circuit Courts. The components of the system are a person master file, arrest/offense trailer records, and the index accessible by name, alias, social security number, Police I.D., etc. The reports generated by this system are docket, custody status, jail history, arrest record, and court caseload statistics (Exhibits 15 & 16). Other court information systems are in Fairfax County for all courts, Portsmouth—an automated traffic system, and Richmond—arrest system and juvenile records. The Juvenile Justice Information System, a time-sharing system, was a failure in the Tidewater region. Richmond Juvenile and Domestic Relations Court has installed a minicomputer which tracks support cases and performs docketing tasks. Frederick, Winchester, Roanoke, Portsmouth and Virginia Beach have implemented systems to automate some functions of the clerk's office and at the circuit court level to provide for juror management. Juror management includes selection, notification, and payment of trial juries.

CRIMINAL JUSTICE INFORMATION SYSTEMS

LEAA has established its Comprehensive Data Systems (CDS) Program to coordinate and accelerate the development of comprehensive state criminal justice information systems. Two components of the CDS are Computerized Criminal History (CCH) files and Offender-Based Transaction Statistics System (OBTS). The CCH files form a central report source for the important events in the cases of individuals charged with serious crimes. Virginia has developed the Central Criminal Records Exchange (CCRE) for the state-level reporting. The CCRE is maintained by the State Police. Courts contribute disposition information, but although extensive files exist, little is done with the information except for police use (Exhibit 17). Since 1973, the OBTS has been in the development stage under the Secretary of Public Safety.

Many states are in a similar position to Virginia's. Partial systems are underway, yet none are fully satisfactory. There are three primary reasons. While the cost of development is funded by LEAA, operating costs are not. The annual running costs of such systems may amount to several million dollars. For the same cost, there may be alternatives which are more flexible and less risky. The second problem is that the more comprehensive a system, the more the quantity and quality of data input. This takes large amounts of time. Current laws also prohibit the replacement of the manual systems now in existence. If the manual systems are not replaced, the workload is significantly increased.

LEGAL RESEARCH

Legal research systems are under development or have been implemented by several commercial vendors. Basically these systems involve computer-assisted text look-up using keyword search and text selection algorithms. The LEAA-sponsored organization, SEARCH Group, Inc., has evaluated the practicality of computerized legal research for multiple criminal justice agencies and the three systems currently on the market. SEARCH is a non-profit consortium of states involved in criminal justice research and "dedicated to improving the administration of justice in the U. S. by applying advanced technology to justice systems." The projects include development of national standards and goals for criminal justice agencies, state judicial information sys

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tems (recently transferred to the National Center for State Courts), strategy for implementing privacy and security regulations, etc.

The three legal research systems studied were LEXIS, WESTLAW, and JURIS. LEXIS was developed by Mead Data Corporation, WESTLAW by West Publishing Company, and JURIS by the U. S. Justice Department. JURIS was evaluated in Virginia for a six-month period. It was not successful since it contained federal cases not directly applicable to state law.

```
                          T R A C E R  -  PERSONS INFORMATION     PAGE:
ACTION:      TRN:           NEXT FUNCTION:
NAME:                              SEX:   RAC:   DOB:          HGT:     WGT:
ORI:            HAI:      EYE:      SKN:      POB:                  STATE:
ALIAS:                             SEX:   RAC:   DOB:          HGT:     WGT:
ORI:            HAI:      EYE:      SKN:      POB:                  STATE:
RES ADD #:        DIR:     NAME:                        STYPE:     CITY:
ORI:            STATE:    ZIP:        PHONE#:(      )
EMPLOYER NAME:                              OCC:
ORI:            ADDRESS:
RELATIONS NAME:                             RELATIONSHIP:
ORI:            ADDRESS:
IDENTIFIERS: ORI:            LOCAL ID#:             SMT:
SID:             FBI:           SOC:           OLS:     OLN:
LIC:           LIS:    LIY:     MIL BRANCH:       STATUS:   MARITAL STATUS:
JAIL ID#:        J&D COURT#:          EDUCATION:     YEARS DEPENDENTS:
COMMENT:
ORI:            CAUTION IND:
NCIC FPC:                       HENRY FPC:
ORI:
```

```
                          T R A C E R  -  PERSONS INFORMATION     PAGE:
ACTION:      TRN: 00000001 NEXT FUNCTION:
NAME: JONES,MIKE                   SEX: M RAC: W DOB: 030454 HGT: 510 WGT: 150
ORI:            HAI: BLK EYE: BLU SKN: FAR POB: LITTLETOWN      STATE: PA
ALIAS: CRAZY JOE                   SEX:   RAC:   DOB:          HGT:     WGT:
ORI:            HAI:      EYE:      SKN:      POB:                  STATE:
RES ADD #: 124   DIR: S  NAME: SONNY            STYPE: ST CITY: NORFOLK
ORI:            STATE: VA ZIP: 12345 PHONE#:( 803 ) 345 - 1122
EMPLOYER NAME: ACME BRICK CO                OCC: BRICKLAYER
ORI:            ADDRESS: WATERFRONT DR
RELATIONS NAME: JONES,JACK                  RELATIONSHIP: FATHER
ORI:            ADDRESS: 235 S MISSION RD NORFOLK
IDENTIFIERS: ORI:            LOCAL ID#: 33444433   SMT: SCR L HND
SID: VA9886777  FBI: 66677G     SOC: 345872344 OLS: VA OLN: 9978877666
LIC: AXD347   LIS: VA LIY: 76 MIL BRANCH: ARMY  STATUS: R MARITAL STATUS: S
JAIL ID#: 977778 J&D COURT#:          EDUCATION: 10 YEARS DEPENDENTS: 0
COMMENT: KNOWN TO RESIST ARREST
ORI:            CAUTION IND: X
NCIC FPC: AATTAA12TT7865PIPOTT HENRY FPC:
ORI:
```

Exhibit 15

From the collection of the Computer History Museum (www.computerhistory.org)

The Virginia State Bar has developed a data base of Virginia Supreme Court decisions and Attorney General opinions to be used for legal research. The project has missed many deadlines and has cost overruns. The funding agency recently recommended discontinuance.

FUTURE DEVELOPMENT

In 1979, the Supreme Court of Virginia will begin the study, "Computer Options of the Virginia Judicial System." The objective of the study is to provide a comprehensive

```
                    T  R  A  C  E  R  - ARREST INFORMATION          PAGE:
ACTION:      ARREST REPORT *          TRN*:              FCT:       ORI:
NAME:                                 SEX:   RAC:   DOB:
ADDR:
POA:  ADDRESS:                                  CITY:
DOA:         TIME:       AOF:                     AOF*:      PCT:   D/STN:   SQUAD:
ASSISTING OFFICER 1:       2:        PHOTO*:
GENERAL COMMENT:

CHARGE     CIT:              C/S:   M/F:   AON:      GOC:   WRNT*:
DOO:         TIME:       ST*:       DIR:    NAME:                          STYPE:
WRNT BY:      COMPLNT:                                 COURT DATE:         DOCKET:
CIR:

CHARGE     CIT:              C/S:   M/F:   AON:      GOC:   WRNT*:
DOO:         TIME:       ST*:       DIR:    NAME:                          STYPE:
WRNT BY:      COMPLNT:                                 COURT DATE:         DOCKET:
CIR:

AMOUNT OF BOND$:          BOND TYPE:     DATE:          TIME:       MAGISTRATE:
MORE CHARGES: Y
```

```
                    T  R  A  C  E  R  - ARREST INFORMATION          PAGE:
ACTION: ADD ARREST REPORT *          TRN*: 00000001   FCT:       ORI: VA1170000
NAME:                                 SEX:   RAC:   DOB:
ADDR:
POA:  ADDRESS: 132 E TIDEWATER DR          CITY: NORFOLK VA
DOA: 010176 TIME: 1800 AOF: RANDOLPH,ADAM   AOF*: 1234 PCT: 1 D/STN:   SQUAD:
ASSISTING OFFICER 1:       2:        PHOTO*: 12345
GENERAL COMMENT:

CHARGE     CIT: 18.2-50     C/S: S M/F: F AON: 0900 GOC:   WRNT*: 123456644F
DOO: 010176 TIME: 1300 ST*: 132   DIR: S  NAME: BOSTON                STYPE: RI
WRNT BY: PLG COMPLNT: SMITH,MIKE                COURT DATE: 010276 DOCKET: CF
CIR: DEFENDANT ASSAULTED 2 PERSONS RESULTING IN THE DEATH OF MIKE
     SMITH BY STABBING
CHARGE     CIT: 18.2-51     C/S: S M/F: F AON: 1300 GOC:   WRNT*: 877655555F
DOO:         TIME:       ST*:       DIR:    NAME:                          STYPE:
WRNT BY:      COMPLNT: JONES,PAUL               COURT DATE:         DOCKET:
CIR: DEFENDANT WOUNDED PAUL JONES BY STABBING

AMOUNT OF BOND$: 0005000 BOND TYPE:     DATE:          TIME:       MAGISTRATE: PLI
MORE CHARGES: N
```

Exhibit 16

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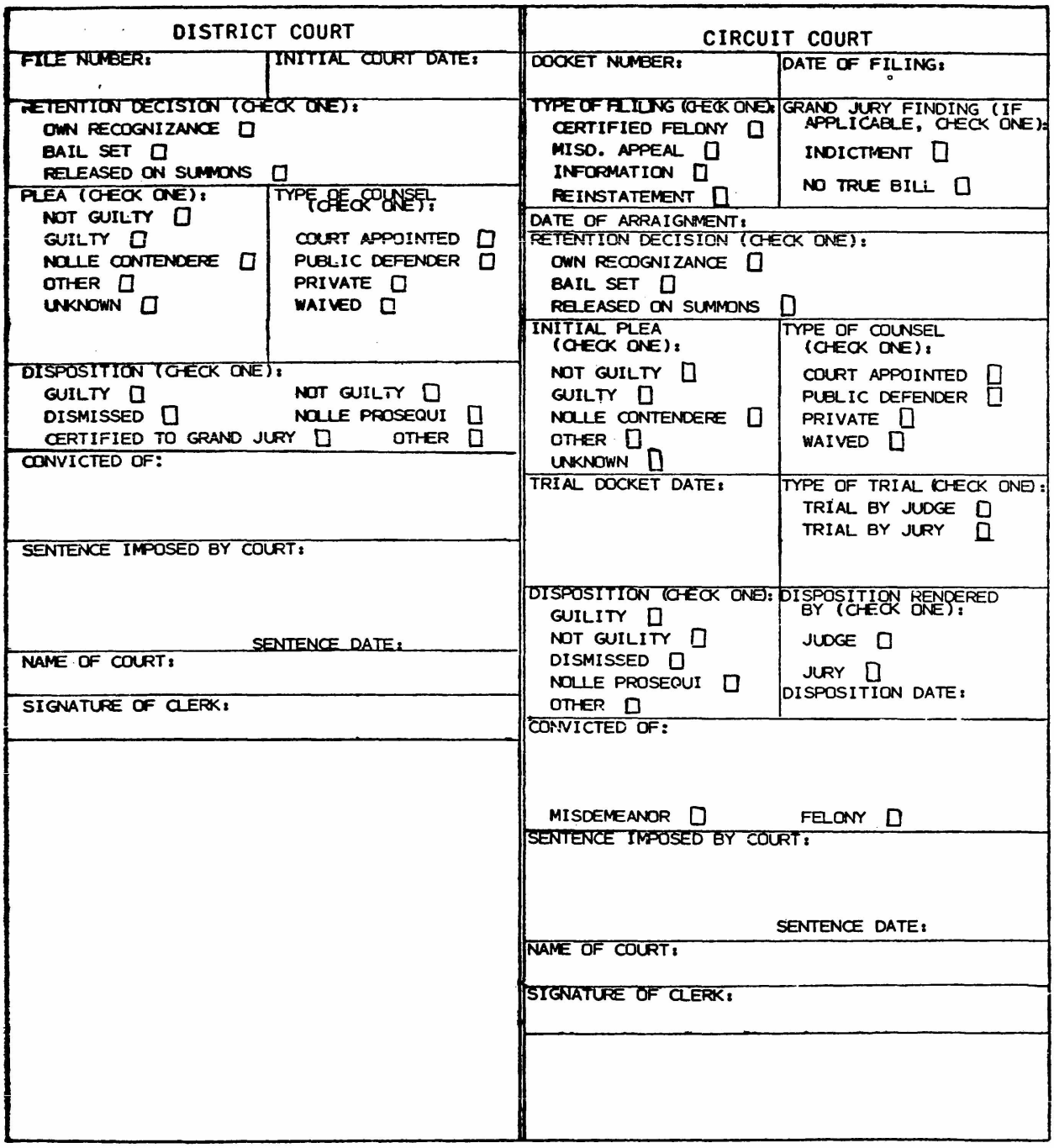

Exhibit 17

plan to identify the areas in which computer development should be achieved. The plan will consider what systems currently exist, what functions of the court can be effectively automated, hardware needs of the judicial system, and the cost/benefits and feasibility of a statewide judicial computer network.

New court computerization will result from continual balancing between the ideal system and the practical constraints of the judicial branch of government. Each system will be carefully weighted and subjected to critical analysis in light of decreased federal funding. Contending needs will be addressed—needs for increased quality of and improved

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information, simplicity and usability of systems, consideration of the judiciary's independent status, and flexibility to accommodate future needs. New systems must meet enunciated goals. They must have a sound basis on which more complex systems can be built. Constant review and evaluation during development, implementation and operation will be required to ensure that the needs of the Courts are met.

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